

DEPARTMENT OF FISH AND GAME

Bay-Delta and Special Water Projects Division
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February 14, 1995

Mr. Roger James
Santa Clara Valley Water District
5750 Almaden Expressway
San Jose, California 95118

Dear Mr. James:

I am glad that CVA/AG is developing a definition of ecosystem management. As the discussion at the CalFed meeting Friday indicated, it is a rather elusive concept. I am concerned that ecosystem management seems to be perceived as synonymous with good management. Since we are frequently charged with ecosystem management these days, a better understanding of issues associated with the term is important. The purpose of this letter is to offer some thoughts which hopefully will be useful in moving the process along.

To me an appropriate technical definition is something like:

"Ecosystem management is considering the individual and collective needs of all organisms when managing the physical, chemical and biological components of an ecosystem." I used "consider" because you can't satisfy the sometimes competing needs of all species.

One major problem in such management is we will always have an imperfect understanding of the needs of organisms.

I think an even more important shortcoming is that a general technical definition, such as the one above, does not describe the goals of such management. The principal differences among various interests relate to goals.

Let me illustrate with an example. We might design a management strategy intended to optimize San Francisco Bay as habitat for marine aquatic resources, taking into account the diverse needs of marine species using the Bay now, and those likely to move into the Bay if it were saline. If we did that well, we could have great ecosystem management but find it totally unacceptable to major interests concerned with the Estuary.

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Thus, we may achieve a consensus on a technical definition of ecosystem management without making significant progress towards achieving consensus on management of the Estuary. I assume the latter is our real goal.

Should we consider incorporating the concept of goals in a definition of ecosystem management so the term truly becomes synonymous with good management? The following is one attempt to do that:

"Ecosystem management is considering the individual and collective needs of all organisms in managing an ecosystem to maximize benefits of the ecosystem while recognizing the overall needs of society."

Such a definition might be a useful step towards consensus on managing the Estuary. For one thing, it would involve dealing at least conceptually with tradeoffs between benefits of the ecosystem and other benefits sought by society. I am skeptical, however, that it would be worth the effort.

Instead, I lean toward a narrow technical definition of ecosystem management, such as the one proposed at the beginning of this letter. Then focus on defining a broad management goal specifically for the Estuary. It presumably would say that we would apply ecosystem management to achieve certain purposes.

At this point, I am tempted to offer such a goal but that would divert us from a debate on defining ecosystem management which is my purpose in this letter.

I would welcome further discussion if your committee considers it useful and plan to circulate this letter among the IEP agencies to get their reaction.

Sincerely,

Pete Chadwick
Liaison
Bay-Delta Oversight Council

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